

TOSHIBA TRANSISTOR SILICON PNP TRIPLE DIFFUSED TYPE

2SA1939

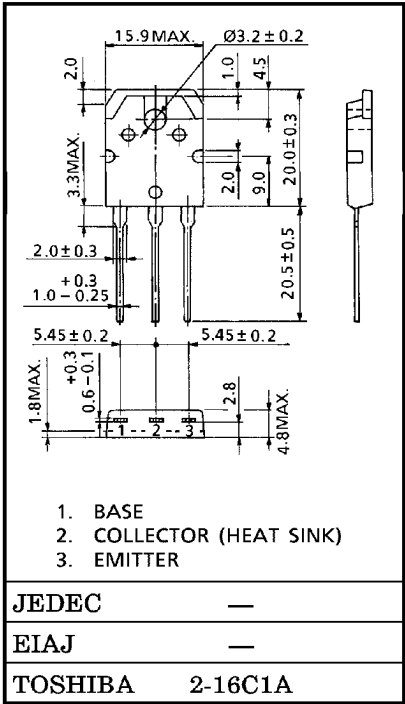
POWER AMPLIFIER APPLICATIONS

Unit in mm

- Complementary to 2SC5196
- Recommend for 40W High Fidelity Audio Frequency Amplifier Output Stage.

MAXIMUM RATINGS (Ta = 25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Collector-Base Voltage	V _{CB0}	−80	V
Collector-Emitter Voltage	V _{CEO}	−80	V
Emitter-Base Voltage	V _{EBO}	−5	V
Collector Current	I _C	−6	A
Base Current	I _B	−0.6	A
Collector Power Dissipation (Tc = 25°C)	P _C	60	W
Junction Temperature	T _j	150	°C
Storage Temperature Range	T _{stg}	−55~150	°C



ELECTRICAL CHARACTERISTICS (Ta = 25°C)

Weight : 4.7g (Typ.)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Collector Cut-off Current	I _{CBO}	V _{CB} = −80V, I _E = 0	—	—	−5.0	μA
Emitter Cut-off Current	I _{EBO}	V _{EB} = −5V, I _C = 0	—	—	−5.0	μA
Collector-Emitter Breakdown Voltage	V _{(BR) CEO}	I _C = −50mA, I _B = 0	−80	—	—	V
DC Current Gain	h _{FE} (1) (Note)	V _{CE} = −5V, I _C = −1A	55	—	160	
	h _{FE} (2)	V _{CE} = −5V, I _C = −3A	35	80	—	
Collector-Emitter Saturation Voltage	V _{CE (sat)}	I _C = −5A, I _B = −0.5A	—	−1.0	−2.0	V
Base-Emitter Voltage	V _{BE}	V _{CE} = −5V, I _C = −3A	—	−0.95	−1.5	V
Transition Frequency	f _T	V _{CE} = −5V, I _C = −1A	—	30	—	MHz
Collector Output Capacitance	C _{ob}	V _{CB} = −10V, I _E = 0, f = 1MHz	—	180	—	pF

Note : h_{FE} (1) Classification R : 55~110, O : 80~160

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